

This listing of claims will replace all prior versions, and listings, of claims in the application. Please cancel claims 30, 39, 41, 43, and 45, amend claims 9, 31, 38, and 40 and add claims 53-69 as follows:

1. (Previously Canceled)
2. (Previously Canceled)
3. (Previously Canceled)
4. (Previously Canceled)
5. (Previously Canceled)
6. (Previously Canceled)
7. (Previously Canceled)
8. (Previously Canceled)
9. (Currently Amended) A method of applying an axial force to a first piston positioned within a first piston chamber, comprising:
  - positioning a second piston within the first piston chamber;
  - pressurizing the first piston chamber by injecting fluidic materials into the first piston chamber;
  - displacing the second piston relative to the first piston within the first piston chamber; and
  - applying an axial force to the first piston using the second piston within the first piston chamber;

wherein the first piston comprises an expansion device for radially expanding and plastically deforming a tubular member.

10. (Previously Canceled)

11. (Previously Canceled)

12. (Previously Canceled)

13. (Previously Canceled)

14. (Previously Canceled)

15. (Previously Canceled)

16. (Previously Canceled)

17. (Original) The method of claim 9, wherein the first and second pistons have annular cross sections.

18. (Original) The method of claim 9, further comprising:  
movably coupling the first and second pistons to a tubular support member  
defining an internal passage.

19. (Original) The method of claim 18, further comprising:  
displacing the second piston; and  
exhausting fluidic materials displaced by the second piston into the internal  
passage of the tubular support member.

20. (Original) The method of claim 19, wherein exhausting fluidic materials displaced by the second piston into the internal passage of the tubular support member comprises:

exhausting fluidic materials within an exhaust chamber defined between the second piston and the tubular support member displaced by the second piston into the internal passage of the tubular support member.

21. (Original) The method of claim 20, wherein the first piston chamber and the exhaust chamber have annular cross sections.

22. (Original) The method of claim 20, wherein the cross sectional area of the first piston chamber is greater than the cross sectional area of the exhaust chamber.

23. (Original) The method of claim 20, wherein the operating pressure of the exhaust chamber is less than a portion of the first piston chamber downstream from the first piston.

24. (Original) The method of claim 20, wherein the exhaust chamber is fluidically isolated from the first piston chamber.

25. (Previously Amended) The method of claim 9, further comprising:  
applying an axial force to the first piston by direct application of the fluidic materials.

26. (Original) The method of claim 9, wherein a portion of the first piston chamber upstream from the first piston has a larger cross sectional area than a portion of the first piston chamber downstream from the first piston.

27. (Original) The method of claim 26, wherein the first piston chamber has an annular cross section.

28. (Original) The method of claim 9, wherein:  
the cross sectional area of the first piston is greater than the cross sectional area  
of the second piston.
29. (Previously Canceled)
30. (Canceled)
31. (Currently Amended) The method of claim [30] 9, wherein the expansion  
device includes one or more outer tapered surfaces for engaging the tubular member.
32. (Previously Amended) The method of claim 9, further comprising:  
applying an axial force to the first piston by direct application of the fluidic  
materials;  
wherein a portion of the first piston chamber upstream from the first piston has a  
larger cross sectional area than a portion of the first piston chamber  
downstream from the first piston; and  
wherein the first piston chamber has an annular cross section.
33. (Previously Amended) The method of claim 9, further comprising:  
movably coupling the first and second pistons to a tubular support member  
defining an internal passage;  
displacing the second piston; and  
exhausting fluidic materials within an exhaust chamber defined between the  
second piston and the tubular support member displaced by the second  
piston into the internal passage of the tubular support member;  
wherein the first piston chamber and the exhaust chamber have annular cross  
sections;  
wherein the tubular support member is received within the first and second  
pistons;

wherein the cross sectional area of the first piston chamber is greater than the cross sectional area of the exhaust chamber;

wherein the operating pressure of the exhaust chamber is less than a portion of the first piston chamber downstream from the first piston; and

wherein the exhaust chamber is fluidically isolated from the first piston chamber.

34. (Currently Amended) The method of claim 9, [further comprising:]

wherein the cross sectional area of the first piston is greater than the cross sectional area of the second piston; and

wherein the first piston comprises an expansion device including one or more outer tapered surfaces for radially expanding and plastically deforming a tubular member.

35. (Previously Amended) A method of displacing an annular expansion cone for radially expanding an expandable tubular member, comprising:

movably coupling the annular expansion cone to a first tubular support member defining an internal passage;

positioning the annular expansion cone within a first annular chamber defined between the expandable tubular member and the first tubular support member;

positioning an annular piston within a second annular chamber defined between the first tubular support member and a second tubular support member;

defining a third annular chamber between the annular piston and the first tubular support member that is fluidically coupled to the internal passage of the first tubular support member;

injecting fluidic materials into the second annular chamber to displace the annular piston relative to the annular expansion cone within the second annular chamber;

exhausting fluidic materials displaced by the annular piston out of the third annular chamber into the internal passage of the first tubular support member; and

the annular piston impacting and displacing the annular expansion cone relative to the first tubular support member;  
wherein the cross sectional area of the second annular chamber is greater than the cross sectional area of the third annular chamber;  
wherein the first and second annular chambers are fluidically isolated from the third annular chamber; and  
wherein a cross sectional area of a region of the first annular chamber upstream from the annular expansion cone is greater than a cross sectional area of a region of the first annular chamber downstream from the annular expansion cone.

36. (Previously Presented) The method of claim 9, further comprising:  
displacing the second piston toward to the first piston within the first piston chamber.

37. (Previously Presented) The method of claim 9, wherein applying an axial force to the first piston using the second piston within the first piston chamber comprises:  
impacting the first piston with the second piston within the first piston chamber.

38. (Currently Amended) A method of applying an axial force to a first piston positioned within a first piston chamber, comprising:  
positioning a second piston within the first piston chamber;  
displacing the second piston relative to the first piston within the first piston chamber;  
and  
applying an axial force to the first piston using the second piston within the first piston chamber;  
wherein the first piston is coupled to an expansion device for radially expanding and plastically deforming a tubular member.

39. (Canceled)

40. (Currently Amended) A method of applying an axial force to a first piston positioned within a first piston chamber, comprising:  
positioning a second piston within the first piston chamber; and  
applying an axial force to the first piston by impacting the first piston with the second piston within the first piston chamber;  
wherein the first piston is coupled to an expansion device for radially expanding and plastically deforming a tubular member.

41. (Canceled)

42. (Previously Presented) The method of claim 40, further comprising:  
applying an axial force to the first piston through the direct application of fluid pressure.

43. (Canceled)

44. (Previously Presented) The method of claim 40, further comprising:  
displacing the second piston relative to the first piston within the first piston chamber;  
applying an axial force to the first piston by impacting the first piston with the second piston within the first piston chamber; and  
then displacing the first and second pistons together within the first piston chamber.

45. (Canceled)

46. (Previously Presented) The method of claim 18, wherein the first and second pistons have annular cross sections; and wherein the tubular support member is received within the first and second pistons.

47. (Previously Presented) The method of claim 46, further comprising:  
displacing the second piston; and

exhausting fluidic materials displaced by the second piston into the internal passage of the tubular support member.

48. (Previously Presented) The method of claim 47, wherein exhausting fluidic materials displaced by the second piston into the internal passage of the tubular support member comprises:

exhausting fluidic materials within an exhaust chamber defined between the second piston and the tubular support member displaced by the second piston into the internal passage of the tubular support member.

49. (Previously Presented) The method of claim 48, wherein the first piston chamber and the exhaust chamber have annular cross sections.

50. (Previously Presented) The method of claim 48, wherein the cross sectional area of the first piston chamber is greater than the cross sectional area of the exhaust chamber.

51. (Previously Presented) The method of claim 48, wherein the operating pressure of the exhaust chamber is less than a portion of the first piston chamber downstream from the first piston.

52. (Previously Presented) The method of claim 48, wherein the exhaust chamber is fluidically isolated from the first piston chamber.

53. (New) A method of applying an axial force to a first piston positioned within a first piston chamber, comprising:

positioning a second piston within the first piston chamber;  
pressurizing the first piston chamber by injecting fluidic materials into the first piston chamber;  
displacing the second piston relative to the first piston within the first piston chamber;



applying an axial force to the first piston using the second piston within the first piston chamber; and  
movably coupling the first and second pistons to a tubular support member defining an internal passage.

54. (New) The method of claim 53, further comprising:  
displacing the second piston; and  
exhausting fluidic materials displaced by the second piston into the internal passage of the tubular support member.
55. (New) The method of claim 54, wherein exhausting fluidic materials displaced by the second piston into the internal passage of the tubular support member comprises:  
exhausting fluidic materials within an exhaust chamber defined between the second piston and the tubular support member displaced by the second piston into the internal passage of the tubular support member.
56. (New) The method of claim 55, wherein the first piston chamber and the exhaust chamber have annular cross sections.
57. (New) The method of claim 55, wherein the cross sectional area of the first piston chamber is greater than the cross sectional area of the exhaust chamber.
58. (New) The method of claim 55, wherein the operating pressure of the exhaust chamber is less than a portion of the first piston chamber downstream from the first piston.
59. (New) The method of claim 55, wherein the exhaust chamber is fluidically isolated from the first piston chamber.
60. (New) A method of applying an axial force to a first piston positioned within a first piston chamber, comprising:

positioning a second piston within the first piston chamber;  
pressurizing the first piston chamber by injecting fluidic materials into the first piston chamber;  
displacing the second piston relative to the first piston within the first piston chamber; and  
applying an axial force to the first piston using the second piston within the first piston chamber;  
wherein a portion of the first piston chamber upstream from the first piston has a larger cross sectional area than a portion of the first piston chamber downstream from the first piston.

61. (New) The method of claim 60, wherein the first piston chamber has an annular cross section.

62. (New) A method of applying an axial force to a first piston positioned within a first piston chamber, comprising:

positioning a second piston within the first piston chamber;  
pressurizing the first piston chamber by injecting fluidic materials into the first piston chamber;  
displacing the second piston relative to the first piston within the first piston chamber;  
applying an axial force to the first piston using the second piston within the first piston chamber;  
movably coupling the first and second pistons to a tubular support member defining an internal passage;  
displacing the second piston; and  
exhausting fluidic materials within an exhaust chamber defined between the second piston and the tubular support member displaced by the second piston into the internal passage of the tubular support member;  
wherein the first piston chamber and the exhaust chamber have annular cross sections;

wherein the tubular support member is received within the first and second pistons;  
wherein the cross sectional area of the first piston chamber is greater than the cross sectional area of the exhaust chamber;  
wherein the operating pressure of the exhaust chamber is less than a portion of the first piston chamber downstream from the first piston; and  
wherein the exhaust chamber is fluidically isolated from the first piston chamber.

63. (New) The method of claim 53, wherein the first and second pistons have annular cross sections; and wherein the tubular support member is received within the first and second pistons.

64. (New) The method of claim 63, further comprising:  
displacing the second piston; and  
exhausting fluidic materials displaced by the second piston into the internal passage of the tubular support member.

65. (New) The method of claim 64, wherein exhausting fluidic materials displaced by the second piston into the internal passage of the tubular support member comprises:  
exhausting fluidic materials within an exhaust chamber defined between the second piston and the tubular support member displaced by the second piston into the internal passage of the tubular support member.

66. (New) The method of claim 65, wherein the first piston chamber and the exhaust chamber have annular cross sections.

67. (New) The method of claim 65, wherein the cross sectional area of the first piston chamber is greater than the cross sectional area of the exhaust chamber.

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68. (New) The method of claim 65, wherein the operating pressure of the exhaust chamber is less than a portion of the first piston chamber downstream from the first piston.

69. (New) The method of claim 65, wherein the exhaust chamber is fluidically isolated from the first piston chamber.